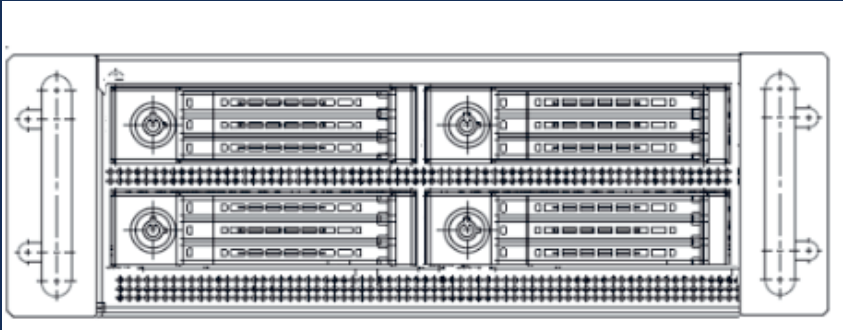


HALF19 2U RUGGED NAS NAS-245RH-S7

expando



2U

Platform

1

CPU

96TB

Storage

12

Hot Swap SSD

19"/2

Rack Width

450
mm

Depth

HALF19 is a family of rugged servers, NAS and workstations with an aluminum construction, designed for applications that require robust and qualified MIL-GRADE equipment, suitable for operations in critical environments.

The NAS-245RH-S7 is a rugged network attached storage (NAS) system featuring single socket MB with Intel® Xeon® Processor D-1736NT, 8C, TDP 67W. The integrated IPMI services support monitoring, control, and management functions sending alarm notifications in case of critical events.

NAS-245RH-S7 have a 2U compact modular chassis with a depth of 450mm and are provided with front brackets suitable for half 19" rack space mounting. Two units can also be paired with a retention kit to be accommodated into a standard 19" rack.

The NAS-245RH-S7 have a single power supply layout with 28VDC input. The front panel includes up to (four removable U.2 NVMe SSD) or up to 12 removable 2.5" SAS/ SATA SSDs.

NAS-245RH-S7 is equipped with up to 128GB Registered ECC RDIMM. It also is equipped with M.2 M-Key 2280 (SATA/PCIe 4.0 x4), dual 25G SFP28 with Intel SoC and dual 10Gbase-T RJ-45 with Intel® Ethernet Controller.

The NAS-245RH-S7 is equipped with the integrated boards; AOC-S3916 SATA Hardware RAID Controller and the AOM-TPM-9670V: Trusted Platform Module 2.0. The Rear Connectors installed in the NAS-245RH-S7 are; 1 x IPMI LAN, 2 x USB 3.0, 2 x 10GbE (copper) and 2 x 25GbE (fiber, SFP28).

The I/O connectors and the power supply input can be provided with MIL-GRADE connectors upon request.

All units are delivered with their inventory list to ensure configuration control and reproducibility over time. Upon request, all server configurations can run specific thermal or mechanical environmental stress test.

FEATURES

- **Single socket MB with Intel® Xeon® processor D-1736NT, 8C**
- **2U HALF19 - 450 mm depth**
- **Single PSU, 28VDC input**
- **M.2 M-Key 2280 (SATA/PCIe 4.0 x4)**
- **Removable fan**
- **Dual 25G SFP28 with Intel SoC**
- **MIL-STD-810G**
- **5 year Warranty**
- **Storage: 12 x SSD 7.68TB SATA SSD 2.5" (7mm) front accessible, RAID 5**
- **FreeNAS OS**
- **HW PCIe RAID Controller**
- **Memory: Up to 128GB ECC RDIMM, DDR4-2666MHz**
- **96 TB Storage**

TECHNICAL SPECIFICATIONS

SYSTEM

CPU	Intel® Xeon® processor D-1736NT, 8C
Memory	Up to 128GB ECC RDIMM, DDR4-2666MHz
Chipset	System on Chip
Graphics	1 Aspeed AST2600 BMC port(s)
Network Connectivity	Dual LAN with 25G SFP28 LAN via SoC Dual LAN with 10GBase-T with Intel® X550
Storage	12 x SSD 7.68TB SATA 6Gb/s TLC 2.5" front accessible, RAID 5
TPM	1 TPM Header & Chip both
Motherboard	Intel® Xeon® Processor D-1736NT, 8C, TDP 67W
Expansion slots	PCIe: 1 PCIe 4.0 x8, 1 PCIe 3.0 x4 (or 4x SATA), via Oculink M.2: M.2 Interface: 1 SATA/PCIe 4.0 x4 (Form Factor: 2280 Key: M-Key)
Software	FreeNAS
IPMI	ASPEED AST2600 BMC
Remote Monitoring	Monitoring, control, and management functions (fan speed, temperature, voltage, redundant power failure, power consumption, disk health, raid health, and memory health)

POWER SUPPLY

Power Supply	DC Single Power Supply
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MECHANICAL

Dimensions	249 (213mm body) x 88 x 300 mm (W x H x D)
Material	Aluminum with surface passivation treatment
Colour	NATO Green / RAL 6031 - Powder Coating
Mounting	2U Half of a 19" rackmount chassis; Optional Telescopic slides; Retention kit to pair two units in a 19" rackmount space included
Configuration	Front Disc Access - Rear Power Supply
Drive Bays	12x 2.5"
Fans	1x removable PWM fans

ENVIRONMENTAL - (DESIGN TO MEET)

Operating Temperature	Standard: 0 C / +50 C Extended: -20 C / +60 C (depending on the configurations)
Operating Humidity	5% to 95% non-condensed (depending on the configurations)
Storage Temperature	-40C / +70 C (depending on the configurations)
Vibrations	MIL-STD-810G, Method 514.7, Cat 4 - Proc. I - 2.24 Grms, 5-500 Hz 60 min/axis for 3 axes
Operating Shock	MIL-STD-810G Proc. I Method 516.7 - 15g / 11ms - half sine
Transport shock	MIL-STD-810G Proc. II Method 516.7 - 30g / 9ms sawtooth
Certifications	Directive 2014/35/UE-LVD / Directive 2014/30/UE-EMC Directive 2011/65/UE - RoHS / Regulation (EC) No 1907/2006 - REACH

HALF19 servers and workstations are designed in accordance with the environmental specifications indicated. Some parameters depend on the configuration. Equipment may be subjected to dedicated test profiles.